

# Alerts, Notices, and Case Reports

## Treatment of Dyspareunia Following Medical Illness

JEANNE L. LEVENTHAL, MD  
Hayward, California

MAIDA TAYLOR, MD, MPH  
San Francisco, California

VIRGINIA SADOCK, MD  
New York, New York

SEXUAL DYSFUNCTION may derive from physical, psychological, or social disorders. When a woman experiences a major medical crisis, impaired sexual function often ensues. Sexual complaints generally fall into four categories: inability to reach orgasm, dyspareunia (Table 1), failure of intromission, and a lack of arousal or desire. These can all be affected by a major medical illness. Gynecologic therapies often lead to feelings of diminished femininity. Gynecologic surgical treatment that results in a partial or complete loss of reproductive organs may cause psychological reactions that affect sexual performance and identity.<sup>1,2</sup> Grief and depression over lost reproductive potential are severe in young women. Genital disease also can lead to feelings of being tainted or soiled. Sometimes the disability caused by illness is seen as retribution for real or imagined sins and transgressions.

Any major illness that interrupts normal daily activities has the potential to alter sexual function. Systemic diseases and their therapies cause fatigue, pain, and disability. Sensation may be lost due to neurologic impairment, surgical procedures, or drug therapy. Metabolic disorders alter circulating hormone levels and thereby produce sexual dysfunction. Mutilating operations involving limbs, breasts, and genitals dramatically affect self-image. Persons with changes in body configuration may perceive themselves as greatly diminished and devalued as sexual beings.<sup>3-5</sup>

Acute, serious illness leaves patients with decreased energy and strength. Feelings of weakness, fragility, and vulnerability are inevitable. Patients also fear that sexual activity will precipitate further damage or that disease will be transmitted to the partner through physical contact. Studies show that persons usually resume sexual activity at the same time they return to work.<sup>6</sup> Patients and their partners, however, often view the diminished sexual interest and activity of the recuperative period as final. Although the literature has indicated the need for sexual counseling in severely ill persons, the topic is not routinely covered with gynecologic patients and is rarely discussed with patients with other medical disorders.<sup>7</sup>

When evaluating patients for sexual dysfunction after medical and surgical illness, anatomic and physical impairments must be carefully assessed. After physical limitations have been defined, attention should be focused on psycholog-

ical factors. Therapists counsel the patients regarding which sexual activities they can realistically enjoy. A person's past experience, present level of physical function, and projected level of activity all need to be integrated into the therapeutic plan. The goal is to enhance the patient's sexual function even if defined deficits continue.

In the following report, we describe the differential diagnosis and workup for a complaint of dyspareunia after a chronic medical illness with gynecologic involvement.

### Report of a Case

The patient, a 57-year-old married woman, complained of pain on intercourse for a year. The dyspareunia started after a four-year bout of enterovaginal and enterocutaneous fistulas following two operations for small bowel and colon resection to treat an episode of bowel obstruction. She was diagnosed as having probable inflammatory bowel disease. When she was seen, the only medical problems were recurrent urinary tract infections and dermatitis.

During the course of the patient's medical treatment, she had become dependent on her husband. The husband was always available, would help the patient change her colostomy, and was essential in the wound care regimen. The patient was in and out of the hospital for four years. Twice she came close to dying. The couple slowly decreased their social activities and focused on the overwhelming medical problems. Separate activities such as golf, bridge, stamp collecting, and socializing with friends stopped. The couple's sexual relations stopped soon after the initial enteritis developed. A year after recovery, the patient had immediate

TABLE 1.—Causes of Dyspareunia

Type of Dyspareunia	Cause
<b>Intromission Failure</b>	
Congenital abnormalities . . .	Müllerian failure, agenesis, fusion defects, imperforate hymen, transverse septae, exposure to diethylstilbestrol in utero
Anatomic lesions . . . . .	Vaginal masses or tumors, pelvic relaxation—cystocele, rectocele, prolapse
<b>Painful Intromission or Superficial Dyspareunia</b>	
Infection . . . . .	<i>Candida</i> sp, <i>Gardnerella vaginalis</i> , herpesvirus, other
Lack of hormonal support . . .	Menopause, amenorrhea due to low estrogen level, postpartum low estrogen level
Mechanical . . . . .	Poor episiotomy repair, fistulae
Allergy . . . . .	Medication, lubricant, contraceptives
<b>Deep Dyspareunia</b>	
Adhesive disease . . . . .	Endometriosis, pelvic inflammatory disease—intrauterine device or sexually transmitted disease (STD)
Masses . . . . .	Ovarian cysts (especially corpus luteum), myomata, or other tumors
Other organ system disorders . . . . .	Urinary tract infection, gastrointestinal (irritable or inflammatory bowel)
<b>Other Causes of Dyspareunia</b>	
Fertility concerns . . . . .	Fear of pregnancy, infertility
Fear of STD	
Vaginismus	
Previous rape or abuse	
Drugs . . . . .	Ethyl alcohol, medication

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From the Clinical Faculty, Departments of Psychiatry (Dr Leventhal) and of Obstetrics and Gynecology (Dr Taylor), University of California, San Francisco, School of Medicine, and the Department of Psychiatry, New York University School of Medicine, New York (Dr Sadock).

Reprint requests to Jeanne L. Leventhal, MD, Department of Psychiatry, The Permanente Medical Group, 27400 Hesperian Blvd, Hayward, CA 94545-4299.

vaginal discomfort after attempted intercourse. She was re-evaluated by her gynecologist to determine if the pain was associated with adhesions or remaining inflammation of the vagina. She had no pain on inspection or deep palpation and had no scarring or inflammation of the vagina or introitus. Despite recurrent urinary tract infections, there appeared to be no urethritis or urethral pain. The patient also saw her internist, who thought that sexual intercourse would not cause a recurrence of her fistulas or of her enteritis.

The patient had, in fact, feared that intercourse would cause the recurrence of a vaginal fistula. She felt that she was damaged "down there" and had a painful memory of her draining vaginal fistula. She also reported that her relationship with her husband had changed greatly. She complained that he would "hover" over her and that he was anxious about her health despite her year of recovered good health. He in turn reported that his wife had not resumed her social activities, that she was highly dependent on him, and seemed mildly reclusive and sad. She did not have a clinical depression, however.

Based on the history and medical workup, the patient was diagnosed as having a phobic reaction to intercourse with fears of a fistula recurring. She had difficulties with lubrication and arousal, as well as some introital spasm, which were due to anxiety about resuming sexual relations. Both the patient and her husband needed assurance that sexual intercourse would not result in physical damage or a recurrence of illness. The couple was started on a standard behavioral therapeutic approach with mutual body massage for a few weeks, followed by erotic massage, and then, eventually, intercourse. The couple was advised to approach intercourse gently initially and to use progressive desensitization for intromission. Following this approach, the patient gradually began lubricating normally and became aroused during the massage exercises. The introital spasm disappeared. The couple's interdependence was alleviated by assigning social activities. Also, the patient's dermatitis and recurrent urinary tract infections resolved. The couple chose to continue daily massage, as they found it relaxing.

## Discussion

This couple suffered from a number of problems in their sexual functioning. Initial considerations included psychological factors in the relationship, dyspareunia due to surgical residua, urethritis, cystitis, and anxiety around a fear of vaginal damage. After a complete evaluation, it appeared that psychological factors in the relationship and an anxiety reaction to the patient's prolonged illness were the primary reasons for her dyspareunia. Anxiety, decreased functioning of the couple socially and sexually, and frustration of the husband largely resolved with a behavioral approach to their sexual problems and daily interactions. With a return to normal functioning, the couple recovered from the trauma inflicted by a life-threatening illness.

Others have reported on psychosexual reactions in patients with chronic bowel disease.<sup>8-11</sup> Resistance to evaluating sexual functioning in women who have undergone major medical illness may be due to inexperience on the part of therapists in the differential diagnosis of female sexual dysfunction, a lack of awareness of the frequency of sexual dysfunction following illness, or a fear that such history taking will "open a Pandora's box of problems." The critical factors in therapy are the previous level of sexual functioning, the

previous state of sexual relations, and the cause of the present dysfunction. If previous functioning and sexual relations have been good, then the treatment focuses on the physical and the psychological contributions to the current problem. Sexual dysfunction following severe illness can often be treated successfully with a behavioral approach.

## REFERENCES

1. Donahue VC, Knapp RC: Sexual rehabilitation of gynecologic cancer patients. *Obstet Gynecol* 1977; 49:188-121
2. Glasgow M, Halfin V, Althausen AF: Sexual response and cancer. *CA* 1987; 37:322-333
3. Kolodny R, Masters W, Johnson V: *Textbook of Sexual Medicine*. Boston, Mass, Little, Brown, 1979
4. Sadock V: Psychosexual dysfunction and treatment, *In* Kaplan H, Sadock B (Eds): *The Comprehensive Textbook of Psychiatry*, 4th Edition. Baltimore, Md, Williams & Wilkins, 1985, pp 1077-1090
5. Stanley E: Psychosexual problems. *Br Med J* 1987; 294:39-42
6. Slater SB, Sussmann MB, Stroud MW 3d: Participation in household activities as a prognostic factor for rehabilitation. *Arch Phys Med Rehabil* 1970; 56:605-610
7. Huffman J: The effect of gynecologic surgery on sexual reactions. *Am J Obstet Gynecol* 1950; 59:915-917
8. Guthrie E, Greed FH: Severe sexual dysfunction in women with the irritable bowel syndrome: Comparison with inflammatory bowel disease and duodenal ulceration. *Br Med J* 1987; 295:577-578
9. Druss RG: Psychological response to colectomy. *Arch Gen Psychiatry* 1968; 18:53-59
10. Druss RG, O'Connor JF, Stern LO: Psychological response to colostomy—II. Adjustment to a permanent colostomy. *Arch Gen Psychiatry* 1969; 20:419-427
11. Dlin BM, Perlman A, Ringold E: Psychosexual response to ileostomy and colostomy. *Am J Psychiatry* 1969; 126:374-381

## Botulism Immune Globulin for Infant Botulism Arrives—One Year and a Gulf War Later

PATRICIA J. SCHWARZ  
STEPHEN S. ARNON, MD  
Berkeley, California

ABOUT A YEAR AGO, we directed the WESTERN JOURNAL OF MEDICINE's readers to the clinical trial of botulism immune globulin (BIG), planned to start on January 1, 1991.<sup>1</sup> This clinical trial was intended to assess the efficacy of botulism immune globulin (a human "antitoxin"), supplied by the United States Army, in the treatment of infant botulism. Unfortunately, before the study could begin, the war in the Persian Gulf intervened, and the Army found it necessary to retain its supply for defense against biochemical warfare.<sup>2</sup>

Faced with a delay of unknown length, the California Department of Health Services, with US Food and Drug Administration (FDA) support, created a new supply of BIG. All steps, beginning with the collection of botulism immune plasma from previously immunized volunteer donors, were done in accord with FDA regulations and licensure requirements. Donated plasma was screened for antibody against the human immunodeficiency virus, hepatitis C, and human T-lymphotropic virus type I, in addition to other standard testing. The Massachusetts Public Health Biologic Laboratories, a facility licensed for the production of intravenous immune globulin, fractionated the immune plasma into BIG.

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From the Infant Botulism Prevention Program, California Department of Health Services, Berkeley, California.

Reprint requests to Patricia J. Schwarz, Infant Botulism Prevention Program, California Department of Health Services, 2151 Berkeley Way, Berkeley, CA 94704-1011.